

RECEIVED
CENTRAL FAX CENTER

112.P14046

OCT 30 2006

PatentAMENDMENTS TO THE SPECIFICATION:

Please replace paragraph [0006] with the following amended paragraph:

[0006] FIG. 1 is a cross-sectional schematic drawing showing a prior art back light module. Referring to FIG. 1, the back light module 100 includes a light guide plate 110, a ~~linear~~ linear light source 120 and a reflective cover 130. The light guide plate 110 is, for example, a plate-type light guide plate, which comprises at least one light incident surface 112, a light scattering surface 114 and a light emitting surface 116. The light incident surface 112 is on a sidewall of the light guide plate 110, the light scattering surface 114 is on a bottom surface of the light guide plate 110 and the light emitting surface 116 is on a top surface of the light guide plate 110.

Please replace paragraph [0007] with the following amended paragraph:

[0007] The ~~linear~~ linear light source 120 is, for example, a cold cathode florescent lamp, which is disposed next to the light incident surface 112 of the light guide plate 110, wherein light from the ~~linear~~ linear light source 120 transmits through the light incident surface 112 and enters into the light guide plate 110, and the light scattering surface 114 passes the light to the light emitting surfaces 116 and out thereof.

Please replace paragraph [0008] with the following amended paragraph:

[0008] Additionally, the reflective cover 130 is disposed next to the light incident surface 112 of the light guide plate 110 and covers the ~~linear~~ linear light source 120 for reflecting light from the ~~linear~~ linear light source 120 to the light incident surface 112 of the light guide plate 110.

Please replace paragraph [0009] with the following amended paragraph:

[0009] Referring to FIG. 1, the light scattering surface 114 of the light guide plate 110 provides a enough scattering area. Therefore, light from the ~~linear~~ linear light source 120 after being scattered on the light scattering surface 114 can uniformly travel to the light emitting surface

112.P14046

Patent

116, and the light exiting from the light emitting surface 116 transforms into a plate light source. It should be noted that a plurality of transparent bumps 140 are disposed on the light scattering surface 114 as scattering spots thereof in prior art. The transparent bumps 140, however, are made of the same material of the light guide plate 110 and have the same refractive index as the light guide plate 110. Therefore, the scattering effect on the light scattering surface is limited.

Please replace paragraph [0014] with the following amended paragraph:

[0014] Accordingly, the present invention provides a light guide plate structure applied to a back light module and adapted to transform a ~~linear~~ linear light source into a plate light source. The light guide plate structure comprises a light guide plate and a plurality of transparent elements. The light guide plate comprises at least one light incident surface, light scattering surface and a light emitting surface. The light incident surface is on a sidewall of the light guide plate, the light scattering surface is on a bottom surface of the light guide plate and the light emitting surface is on a top surface of the light guide plate, wherein the light scattering surface has a plurality of notches. The plurality of transparent elements are disposed within the plurality of notches and a reflective index of the plurality of transparent elements is different from that of the light guide plate.

Please replace paragraph [0015] with the following amended paragraph:

[0015] The present invention provides a back light module adapted to provide a plate light source. The back light module comprises a light guide plate structure and a ~~linear~~ linear light source. The light guide plate structure comprises a light guide plate and a plurality of transparent elements. The light guide plate comprises at least one light incident surface, light scattering surface and a light emitting surface. The light incident surface is on a sidewall of the light guide plate, the light scattering surface is on a bottom surface of the light guide plate and the light emitting surface is on a top surface of the light guide plate, wherein the light scattering surface has a plurality of notches. The plurality of transparent elements is disposed within the plurality of notches and a reflective index of the plurality of transparent elements is different from that of the light guide plate. The ~~linear~~ linear light source is next to the light incident surface

112.P14046

Patent

of the light guide plate, wherein light from the ~~linear~~ linear light source transports the light incident surface and enters into the light guide plate, and the light scattering surface passes the light to the light emitting surfaces and out thereof.

Please replace paragraph [0016] with the following amended paragraph:

[0016] In preferred embodiments of the present invention, these transparent elements are made of transparent material, such as glass or acrylic. In addition, the light guide plate is a plate-type light guide plate or a mesa light guide plate. When the light plate is a mesa light guide plate, the plurality of transparent elements have different sizes, the plurality of transparent elements are disposed on the light scattering surface in sequence by the size thereof, and bottom surfaces of the plurality of transparent elements are substantially on a same surface. Therefore, the mesa light guide plate can be firmly disposed on a plastic frame. Moreover, the ~~linear~~ linear light source is, for example, a cold cathode florescent lamp.

Please replace paragraph [0017] with the following amended paragraph:

[0017] In preferred embodiments of the present invention, the back light module further comprises a reflective cover, which is disposed next to the light incident surface of the light guide plate and covers the ~~linear~~ linear light source for reflecting light from the ~~linear~~ linear light source to the light incident surface of the light guide plate. In order to improve luminance of the back light module, a diffusion sheet and a brightness enhancement film can be applied thereto. In the embodiment, the diffusion sheet can be disposed, for example, on the light emitting surface of the light guide plate, and the brightness enhancement film can be disposed on the diffusion sheet.

Please replace paragraph [0024] with the following amended paragraph:

[0024] FIG. 3 is a cross-sectional schematic drawing showing a first preferred back light module in accordance with the present invention. Please referring to FIG. 3, the back light module 200 comprises a light guide plate structure 300 and a ~~linear~~ linear light source 210. The light guide

112.P14046

Patent

plate structure 300 is composed of a light guide plate 310 and a plurality of transparent elements 312. The light guide plate 310 is, for example, a plate-type light guide plate, which comprises at least one light incident surface 312, light scattering surface 314 and light emitting surface 316. The light incident surface 312 is on a sidewall of the light guide plate 310, the light scattering surface 314 is on a bottom surface of the light guide plate 310 and the light emitting surface 316 is on a top surface of the light guide plate 310, wherein the light scattering surface 314 has a plurality of notches 318.

Please replace paragraph [0026] with the following amended paragraph:

[0026] The ~~linear~~ linear light source 210 is, for example, a cold cathode florescent lamp, which is disposed next to the light incident surface 312 of the light guide plate 310, wherein light from the ~~linear~~ linear light source 210 transmits through the light incident surface 312 and enters into the light guide plate 310, and the light scattering surface 314 passes the light to the light emitting surfaces 316 and out thereof.

Please replace paragraph [0027] with the following amended paragraph:

[0027] In addition, the back light module 200 further comprises a reflective cover 220, which is disposed next to the light incident surface 312 of the light guide plate 310 and covers the ~~linear~~ linear light source 210 for reflecting light from the ~~linear~~ linear light source to the light incident surface 312 of the light guide plate 310. In order to improve luminance of the back light module 200, a diffusion sheet 230 and a brightness enhancement film 240 can be applied thereto. In the embodiment, the diffusion sheet 230 can be disposed, for example, on the light emitting surface 316 of the light guide plate 310, and the brightness enhancement film 240 can be disposed on the diffusion sheet 230.